



Power+Energy™

Fueling the Hydrogen Economy

Power + Energy, Inc. Gets Navy Contract For Hydrogen From High Sulfur Diesel Fuels

Office of Naval Research awards \$1M SBIR pact supports fuel cell used with logistical fuels

For Immediate Release

IVYLAND, Pa./EWorldWire/May 10, 2007 --- Power+Energy, Inc. (P+E) has been awarded a Phase II SBIR contract by the DOD's Office of Naval Research (ONR). This contract funds the construction and demonstration of palladium alloy membrane assemblies that can practically and reliably separate hydrogen from logistic fuels containing high concentrations of sulfur. Sulfur immunity is essential in order to use widely available logistics fuels as the hydrogen feedstock for fuel cells. The use of sulfur-immune hydrogen membranes will greatly simplify the reforming and separation processes. In addition, it will improve the efficiency of extracting hydrogen from liquid fuels including diesel, jet fuel, gasoline - all of which are more practical to store than hydrogen. This project is a key milestone in P+E's ongoing efforts directed at providing a unified solution for delivering hydrogen on demand from liquid fuels widely available through existing infrastructures.

P+E's fueling technology has significant implications for the implementation of fuel cells for vehicle applications as well as auxiliary/backup power and remote power applications. This fuel processor technology will permit the use of widely available fuels and infrastructures (including high sulfur fuels) without the need for a sulfur removal step. P+E's high efficiency fuel processors, in combination with PEM fuel cells, can double the useful work derived from a gallon of any liquid fuel including synthetic and bio fuels. It will also reduce carbon dioxide emissions by half and will aid the nation in reducing its dependence on imported oil.

P+E is actively working with a number of leading organizations in integrating fuel cell systems. This includes a series of contracts with the Army Research Office (ARO), DARPA, and the Navy (NAVSEA and ONR) to develop hydrogen separation systems for extracting Hydrogen from Methanol, Ethanol and Diesel fuels. P+E has delivered hydrogen separation systems to the Navy, Battelle and a number of other industry leaders over the past year. The technology is scaleable from small portable systems (50-500 watts) to power plants in the megawatt range. Applications include portable battery chargers, auxiliary and back-up power systems and remote, off-grid power systems.

Power+Energy, Inc., established in 1993, is a privately held firm based near Philadelphia, Pennsylvania. The company develops and manufactures hydrogen purifiers and separators for fuel cell systems as well as a number of applications including semiconductor fabrication, energy research and laboratory applications. P+E has a worldwide customer base and supplies hydrogen purifiers to producers of semiconductors including most major suppliers of high brightness light emitting diodes (LEDs).

Visit '<http://www.powerandenergy.com>' to learn more.

HTML: <http://www.eworldwire.com/pressreleases/16984>

MOBILE: <http://e4mobile.com/pressreleases/16984>

PDF: <http://www.eworldwire.com/pdf/16984.pdf>

ONLINE NEWSROOM: <http://www.eworldwire.com/newsroom/1700.htm>

LOGO: <http://www.eworldwire.com/newsroom/1700.htm>

CONTACT:

Al Stubbmann
Power+Energy, Inc.
106 Railroad Drive
Ivyland, PA 18974
PHONE. 215-942-4600 x 17
FAX. 215-942-9300
EMAIL: al.s@powerandenergy.com

Juan Colina
Power+Energy, Inc.
106 Railroad Drive
Ivyland, PA 18974
PHONE. 215-942-4600
FAX. 215-942-9300
EMAIL: Juan.colina@powerandenergy.com
<http://www.powerandenergy.com>

KEYWORDS: fuel cell,hydrogen,membrane,reforming,renewable energy, methanol, ethanol, diesel, gasoline, automobile, auxiliary power, sulfur, immunity, Navy, palladium, energy

SOURCE: Power+Energy, Inc.